UNIVERSITY OF TENNESSEE HEALTH SCIENCE CAMPUS
CAMPUS MASTER PLAN UPDATE

WORKSHOP 01
FEBRUARY 18, 2019
Agenda

Communication
Understanding
Process
Space Analytics
Opportunities
Discussion
Core Team

Shawn Gaither
Workplace Planner
DLR Group

Michael Del Giudice
Academic Health Center Planner & Project Manager
DLR Group

Krisan Osterby
Lead Campus Planner & Principal in Charge
DLR Group

Linsey Graff
Engagement Specialist
DLR Group

Alex Staneski
Space Analyst
DLR Group

Jackie Kolpek
Placemaking & Site Planning
DLR Group

Stephen Berger
Facility Assessment & Local Coordination
brg3s

James Collins
Transportation & Infrastructure Planning
Kimley-Horn
Core Planning Team

- Michael Del Giudice
  Academic Health Center Planner | Project Manager
  DLR Group
- Shawn Gaither
  Workplace Planner
  DLR Group
- Alex Staneski
  Space Analyst
  DLR Group
- Linsey Graff
  Engagement Specialist
  DLR Group
- James Collins
  Transportation & Infrastructure Planning
  Kimley-Horn
- Jacki Kolpek
  Placemaking + Site Planning
  DLR Group
- Stephen Berger
  Facility Assessment & Local Coordination
  brg3s

Support Team & Specialty Resources

- Phil LiBassi
  Clinical Facility Planner
  DLR Group
- Danile DeBoo
  Research Facility Planner
  DLR Group
- Roger Chang
  MEP & Net Zero Planner
  DLR Group
- Stu Rothenberger
  Student Experience, Dining, & Amenities
  DLR Group
- David Loehr
  Mixed-Use
  DLR Group
- Faraaz Mirza
  Housing
  DLR Group
- Raymond Kent
  AV / IT
  DLR Group
- Matthew Jennings
  Historic Preservation
  DLR Group
- Connie Gowder
  Cost Estimator
  CONNICO, Inc.
- Ron Thompson
  Mechanical Engineer
  Allen & Hoshall
- Rob Herd
  Electrical Engineer
  Allen & Hoshall
Roles and Responsibilities

Executive Committee:
• Set the Vision
• Align with the Strategic Plan
• Confirm Concepts and Implementation Plan

Working Committee:
• O&M Interface
• Confirm Data, Analysis, Experience
• Contribute Ideas

Stakeholders:
• User-group discussions / listening sessions
• Partner engagement and support
Communication Protocol

Primary Point of Contact:

Andrea Kolen

Primary Point of Contact:

Michael Del Giudice
UNDERSTANDING
City/District

- Anchor Institutions
- Developing Areas
- Cycle Track
- Pauline Ave Improvement
- Memphis Innovation Corridor
- Key Projects
Trends: Education, Research, + Clinical Care

- Integrated, Interdisciplinary
- Learning & Research, Evidence Based
- Data Driven, Population Health, Prevention
- Virtual Medicine, Emerging Technology
Impacts: Space

- Shared Spaces
- Translational Research/Bench to Bedside
- Skill Development/Specific Environments
- Access to Technology
Critical Questions:

• What **internal factors** are driving the Master Plan?

• What **external factors** are driving the Master Plan?

• What are the **key physical UTHSC needs** to meet change?
  • Land
  • Buildings
  • Utilities
  • Transportation/Circulation
  • Parking
  • Open Space
The Master Plan IS the LINK between UTHSC’s Strategic and Academic Plans, Facilities Planning, and Capital Appropriation Requests.

- All Capital Improvement Requests are reviewed for (approved) Master Plan Conformity

Primary Guideline Requirements:

- **ENROLLMENT**: Analysis of Previous 10-Years + 5-10 Year Projections to Inform Future Space Need
- **SPACE NEEDS**: Full Space Inventory & Analysis per THEC Space Guidelines to Identify Future Need
- **SITE CONSIDERATIONS**: Land Use; Mobility, Circulation & Parking; Open Space; Stormwater, Community
- **DESIGN GUIDELINES**: Major Design Objectives for Future Campus Development
- **LAND ACQUISITION**: Inventory of Land, Ownership & Needed Land Acquisition or Disposal
- **INFRASTRUCTURE SYSTEMS**: General Conditions & Comparison of Current Demand/Capacity to Future Need
- **STUDENT LIFE/SERVICES | HOUSING/DINNING**: Inventory & Determine Future Qualitative & Quantitative Needs
- **IMPLEMENTATION | CAPITAL IMPROVEMENT**: Recommended Projects, Costs, Priorities & Development Timeline

Approval Process:

- UTHSC COMMITTEES → UT BOARD → THEC → SBC
Engagement Opportunities

Students

Faculty/Staff

Patients

Partners

Community
Proposed Engagement Strategy

**Focus groups we will interact with during the project**

- Students
- Staff
- Parking/Police
- Facilities
- Neighborhood Associations
- Transportation Partners
- Memphis Medical District Institutions
- City of Memphis
- Shelby County
- Others

**Modes of interaction with the campus and community**

- Interviews
- Open Houses
- Focus Groups
- Other
Proposed Engagement Strategy

February/March: **Targeted Interviews**

April: **Campus and Community Open House/Focus Groups**
  • Project Introduction; Poster Sessions (SWOT)

May: **Focus Groups**
  • Big Ideas

July: **Campus Open House and Focus Groups**
  • Review Concepts/Alternatives

September: **Focus Groups**
  • Review Draft Plans

November: **Campus and Community Open House**
  • Review Final Plan
## Proposed Process & Schedule

<table>
<thead>
<tr>
<th>Analysis &amp; Assessment</th>
<th>Big Ideas &amp; Concept Planning</th>
<th>Planning for Implementation</th>
<th>Documentation &amp; Approvals</th>
</tr>
</thead>
<tbody>
<tr>
<td>Identify campus vision, goals, opportunities and needs.</td>
<td>Propose big ideas, options, &amp; development framework.</td>
<td>Synthesize ideas, phasing, &amp; funding.</td>
<td>Deliver final reports, presentations, &amp; digital files.</td>
</tr>
</tbody>
</table>

### Proposed Process & Schedule

**PHASE 1:**
- **January:** Kick-off, SWOT/ISOAR Analysis
- **February:** Project Stakeholder Engagement
- **March:** Focus Group Meetings, Campus Open House
- **April:** Targeted Stakeholder Interviews

**PHASE 2:**
- **May:** Workshop 1 (02/18-19)
- **June:** Workshop 2 (04/15-16)
- **July:** Workshop 3 (05/29-30)
- **August:** Workshop 4 (07/19-11)

**PHASE 3:**
- **September:** Workshop 5 (08/21-22)
- **October:** Workshop 6 (09/25-26)
- **November:** Workshop 7 (11/14-15)

**PHASE 4:**
- **December:** 75% Final Master Plan Report
- **February:** 95% Final Master Plan Report
- **March:** 100% Final Master Plan Report
- **May:** UT System Presentation
- **June:** THEC Presentation
- **July:** TN SBC Presentation
- **August:** Workshop 8 (09/19-20)
- **September:** Workshop 9 (10/21-22)
- **October:** Workshop 10 (11/18-19)
- **November:** Workshop 11 (12/16-17)

**NOTE:**
- Workshop: Face-to-face Meeting | Presentation
- Engagement Session
- Video Conference Meeting
- Deliverable
- UTHSC Review

<table>
<thead>
<tr>
<th>DELIVERABLES</th>
</tr>
</thead>
<tbody>
<tr>
<td>PHASE 1:</td>
</tr>
<tr>
<td>JANUARY:</td>
</tr>
<tr>
<td>FEBRUARY:</td>
</tr>
<tr>
<td>MARCH:</td>
</tr>
<tr>
<td>APRIL:</td>
</tr>
<tr>
<td>PHASE 2:</td>
</tr>
<tr>
<td>MAY:</td>
</tr>
<tr>
<td>JUNE:</td>
</tr>
<tr>
<td>JULY:</td>
</tr>
<tr>
<td>AUGUST:</td>
</tr>
<tr>
<td>PHASE 3:</td>
</tr>
<tr>
<td>SEPTEMBER:</td>
</tr>
<tr>
<td>OCTOBER:</td>
</tr>
<tr>
<td>NOVEMBER:</td>
</tr>
<tr>
<td>DECEMBER:</td>
</tr>
<tr>
<td>PHASE 4:</td>
</tr>
<tr>
<td>2019:</td>
</tr>
<tr>
<td>2020:</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>STATUS</th>
<th>DESCRIPTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>WORKSHOP</td>
<td>FACE-TO-FACE MEETING</td>
</tr>
<tr>
<td>ENGAGEMENT SESSION</td>
<td></td>
</tr>
<tr>
<td>VIDEO CONFERENCE MEETING</td>
<td></td>
</tr>
<tr>
<td>DELIVERABLE</td>
<td></td>
</tr>
<tr>
<td>UTHSC REVIEW</td>
<td></td>
</tr>
</tbody>
</table>
Critical Questions:

• Which additional on-campus or off-campus stakeholders does DLR Group need to engage?

• How should DLR Group engage with UT and THEC?

• What issues, opportunities and conflicts might impact the proposed process?
Space Analysis Process

**Data**
- Existing Space
- Enrollment
- Class Schedule
- Faculty/Staff
- Research $$$
- Patient Volumes
- Animal Facilities
- Parking/ Traffic
- Infrastructure

**Metrics**
- Peers
- AAMC
- THEC
- Productivity
- DLR Group Standards (Quantity & Quality)

**User Input**
- Executive Committee
- Working Committee
- Deans
- Space Planning Department
- Registrar

**Changes**
- New Construction
- Additions
- Renovations
- Repurposing
- Demolitions

**Outcomes**
- Current Utilization
- Existing Space Gaps
- Future Space Needs
- Adjacencies/ Migration
Benchmarking by Space Use

- Dentistry
- Medicine
- Pharmacy
- Nursing

Legend:
- Benchmark High-Low Range
- Average
- Institution
<table>
<thead>
<tr>
<th>ITEM</th>
<th>Penn State University Chemical &amp; BioMedical Engineering State College, PA</th>
<th>Rowan Rutgers Health Science Center, Camden, NJ</th>
<th>SUNY Buffalo UB SMBS, Buffalo, NY</th>
<th>U of Chicago Inst. Molecular Eng'g, Chicago, IL</th>
<th>U of Pittsburgh RiMed, Sicily, PA</th>
<th>1650 Page Mill Stanford SoM, San Francisco, CA</th>
<th>U of Florida Lake Nona A &amp; R Center, Orlando, FL</th>
<th>Wisconsin Inst. for Med Research, Madison, WI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ratio Wet to Dry Research Modules</td>
<td>12 to 1</td>
<td>4 to 1</td>
<td>4 to 1</td>
<td>1 to 1</td>
<td>4 to 1</td>
<td>2 to 1</td>
<td>8 to 1</td>
<td>6 to 1</td>
</tr>
<tr>
<td>Area per PI (SF)</td>
<td>1,304</td>
<td>1,500</td>
<td>850</td>
<td>2,490</td>
<td>1,440</td>
<td>1,382</td>
<td>875</td>
<td>1,400</td>
</tr>
<tr>
<td>PI + Research Team</td>
<td>PI + 6</td>
<td>PI + 6</td>
<td>PI + 4</td>
<td>PI + 15</td>
<td>PI + 8</td>
<td>PI + 10</td>
<td>PI + 6</td>
<td>PI + 6</td>
</tr>
<tr>
<td>Area per Researcher</td>
<td>186</td>
<td>214</td>
<td>170</td>
<td>156</td>
<td>160</td>
<td>126</td>
<td>125</td>
<td>200</td>
</tr>
<tr>
<td>Office Size Director (SF)</td>
<td>138</td>
<td>150</td>
<td>120</td>
<td>150</td>
<td>132</td>
<td>120</td>
<td>120 / 150</td>
<td>142</td>
</tr>
<tr>
<td>Work Station Size (SF)</td>
<td>50</td>
<td>36</td>
<td>31.5</td>
<td>50</td>
<td>20</td>
<td>50</td>
<td>18</td>
<td>30</td>
</tr>
<tr>
<td>Lab Bench LF Per</td>
<td>11'</td>
<td>6'</td>
<td>6'</td>
<td>12'</td>
<td>6'</td>
<td>6'</td>
<td>6'</td>
<td>6'</td>
</tr>
<tr>
<td>Ratio Lab to Lab Support</td>
<td>1.4 to 1</td>
<td>1.5 to 1</td>
<td>1 to 1</td>
<td>2 to 1</td>
<td>1 to 1</td>
<td>1 to 1</td>
<td>1 to 1</td>
<td>2 to 1</td>
</tr>
<tr>
<td>Work Stations In or Out Lab</td>
<td>Outside</td>
<td>Outside</td>
<td>Outside</td>
<td>Outside</td>
<td>Outside</td>
<td>Both</td>
<td>Both</td>
<td>Outside</td>
</tr>
<tr>
<td>Net to Gross</td>
<td>58%</td>
<td>56%</td>
<td>58%</td>
<td>67%</td>
<td>52%</td>
<td>59%</td>
<td>59%</td>
<td>54%</td>
</tr>
<tr>
<td>Net Assignable SF</td>
<td>114,000</td>
<td>62,000</td>
<td>310,832</td>
<td>21,230</td>
<td>174,000</td>
<td>41,544</td>
<td>53,765</td>
<td>236,530</td>
</tr>
<tr>
<td>Gross SF</td>
<td>195,000</td>
<td>110,000</td>
<td>532,104</td>
<td>31,458</td>
<td>335,000</td>
<td>71,544</td>
<td>100,000</td>
<td>469,000</td>
</tr>
<tr>
<td>Vibration</td>
<td>Grade / Basement</td>
<td>VC-B</td>
<td>VC-A</td>
<td>NIST-A</td>
<td>VC-F</td>
<td>VC-F</td>
<td>VC-F</td>
<td>VC-D</td>
</tr>
<tr>
<td>Typical Floor</td>
<td>VC-A</td>
<td>VC-A</td>
<td>VC-A</td>
<td>VC-A</td>
<td>VC-A</td>
<td>VC-A</td>
<td>VC-A</td>
<td>VC-A</td>
</tr>
<tr>
<td>Core Labs</td>
<td>Tissue Culture</td>
<td>Laser Optics</td>
<td>Autoclave</td>
<td>Vivarium</td>
<td>Imaging</td>
<td>Imaging</td>
<td>Imaging</td>
<td>Imaging</td>
</tr>
<tr>
<td></td>
<td>Laser Optics</td>
<td>Autoclave</td>
<td>Synthetic Med Chem</td>
<td>Vivarium</td>
<td>Visceral</td>
<td>Visceral</td>
<td>Visceral</td>
<td>Visceral</td>
</tr>
<tr>
<td></td>
<td>Cold / Warm Room</td>
<td>Viral Vector</td>
<td>Stem Cell</td>
<td>Imaging</td>
<td>Glass Wash</td>
<td>Imaging</td>
<td>Imaging</td>
<td>Imaging</td>
</tr>
<tr>
<td></td>
<td>AFM</td>
<td>Viral Vector</td>
<td>Viral Vector</td>
<td>Imaging</td>
<td>Glass Wash</td>
<td>Visceral</td>
<td>Visceral</td>
<td>Visceral</td>
</tr>
</tbody>
</table>
Integrating Data with Physical Planning
Critical Questions:

• Who are your aspirational peers? – Which institutions/schools/colleges do you look to first?

• What is the single most important space issue facing UTHSC/your program?

• How will UTHSC structure instruction/research in the future? – How will this impact campus space?
The Mission of the University of Tennessee Health Sciences Center is to improve the health and well-being of Tennesseans and the global community by fostering integrated, collaborative, and inclusive education, research, scientific discovery, clinical care, and public service.
UTHSC Strategic Map: 2018-2019 to 2022-2023

Goals Impacting the Master Plan:

• Educate Outstanding Graduates to Meet the Needs of the State & its Communities
• Grow Research Portfolio Focusing on Targeted Areas
• Create Areas of Clinical Prominence while Expanding Outreach
• Align UTHSC resources with Areas of Excellence
• Expand & Strengthen Key Community & Other Partners
• Increase Strategic Integration Across UTHSC
Supporting UTHSC Strategic Map Objectives

Tasks impacting the Master Plan:

• Expand & Strengthen Team-Based Interprofessional Educational Experiences

• Cultivate & Sustain Effective Educational Models & Technologies to Enhance Student Learning & Engagement

• Provide Necessary Infrastructure for Research & Scholarship

• Renovate Facilities to Stimulate Learning Scientific Discovery, and Research

• Address Prioritized Needs/Deficits Requiring Additional Resources

• Allocate Space Based on Need Across UTHSC

• Re-engineer Clinical & Core Services to Increase Effectiveness & Efficiency
Critical Questions:

• What **Master Plan outcomes** are needed to achieve UTHSC Strategic Map goals and objectives?

• What is your **future vision** for:
  • the physical UTHSC campus?
  • the Memphis Medical District?

• How should **UTHSC’s role** in Memphis, Shelby County and Statewide evolve over the next 5 - 10 years?
Critical Opportunities

- Targeted Outcomes
- Clear Future Vision
- Elevated Community Role
Next Steps

- Stakeholder Interviews
- Data Analysis
- Physical Assessment
- Open House Preparation